

## **Technical Support**

Should you have any questions regarding your SR20 microphone please contact us:

e-mail: [Support@EarthworksAudio.com](mailto:Support@EarthworksAudio.com)  
phone: 1-603-654-6427 (9a.m. – 5p.m. ET)

For warranty and product return/exchange information please refer to the back of the enclosed Calibration Chart.



Earthworks, Inc.  
37 Wilton Rd.  
Milford, NH 03055 USA  
Phone: 1-603-654-6427  
Fax: 1-603-654-6107  
<http://www.EarthworksAudio.com>



## **SR20 Cardioid Microphone Owner's Manual**



Made in U.S.A.

## Description

Earthworks SR20 is a directional prepolarized condenser microphone with a first-order cardioid pickup pattern directly coupled to a dedicated wideband, low output impedance transformerless preamplifier. The SR20 requires a standard 48V Phantom Power supply. It features a flat frequency response from 50Hz to 20kHz (Fig. 2), fast impulse response (Fig. 3), very low handling noise, uniform polar pattern, and high SPL handling capabilities. It provides excellent uncolored rejection of sounds arriving off-axis.

The SR20 is protected by US Patent No. 6,091,829.

## Applications

Earthworks SR20 is easy to operate. Connect the microphone to a microphone preamplifier supplying 48V phantom power using a standard XLR microphone cable. *Please allow up to one minute for the microphone to settle.* Plugging in the microphone “hot” (phantom power already present at the input) will not damage the microphone, and is actually preferred for faster settling. It is normal for any phantom powered mic to “pop” when plugged in or powered up. Make sure to mute the signal to speakers or headphones when phantom power is first applied.

The SR20 is designed for vocals and incorporates a screw-on windscreens. It will accurately capture a voice with the same precision up to 90° off-axis. This means the same pristine sound quality is available at the front and side of the microphone. Up close the SR20 is warm, not “boomy”, while its unique windscreens assembly eliminates the popping of P’s. Its uniform polar response will provide more gain before feedback than other mics. Make sure to bring the mixer’s gain down before plugging the SR20 in for the first time as it has much higher output than dynamic mics.

To remove the windscreens unscrew it from the main body. Never use force! Without the windscreens the SR20 becomes a versatile instrument mic, outstanding for piano, guitar, drums, bass, woodwinds, and other instruments.

A mounting clip and a screw-on windscreens are included with the microphone. This microphone has no removable parts other than the windscreens.

## Care of Microphones

Earthworks SR20 microphone is a precision instrument designed and built to provide years of top performance. Following these simple rules will help to protect your investment in the SR20:

- Avoid touching the front protective screen.
- Never attempt to disassemble the microphone – it cannot be opened.
- Avoid extreme heat and condensing humidity. Allow the microphone to warm up in the case when bringing it in from the cold weather. Rough handling may damage the microphone even if no visible marks are left.
- When not in use keep the SR20 in its case.

## Specifications

Frequency response:	50Hz to 20kHz $\pm 2\text{dB}$ at 6 inches (15cm)
Polar Pattern:	Cardioid (Fig. 4)
Sensitivity:	10mV/Pa (-40dBV/Pa)
Power Requirements:	48V Phantom, 10mA
Peak Acoustic Input:	145dB SPL
Output:	XLR (Fig. 1)
Output Impedance:	$100\Omega$ , balanced ( $50\Omega$ ea. pin 2 & 3)
Minimum Load:	$600\Omega$ btw. pins 2 & 3
Noise:	22dBA equivalent
Dimensions L x D	212 x 22 mm (8.4 x .860 in.)
Weight:	135g (.3lb)
CE Compliant	

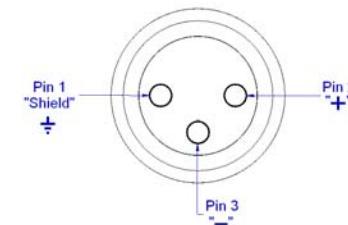


Fig. 1. XLR Output Connector Assignment of SR20

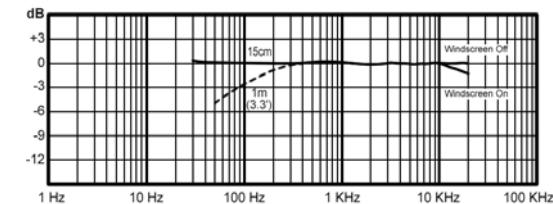


Fig. 2. Frequency Response (Typical) of SR20

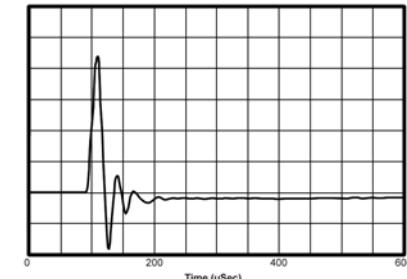


Fig. 3. Impulse Response (Typical) of SR20

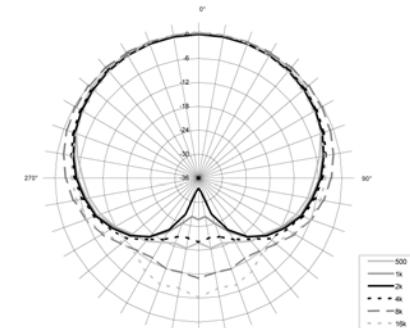


Fig. 4. Polar Response (Typical) of SR20

Specifications are subject to change without notice.